XPA 2001-70V Audio Power Amplifier

The Extron XPA 2001-70V is a half-rack width, mono audio 70 V line distribution amplifier that outputs 200 watts. The XPA 2001-70V utilizes Extron's patented CDRS™ Class D Ripple Suppression technology to reduce EMI. The audio level adjustment feature prevents the occurrence of audio clipping.

Over Temp indicator LED

OVER TEMP

This front panel LED lights red when the amplifier exceeds the recommended ambient temperature for optimal lifetime. The LED turns off after the amplifier cools down sufficiently. See the User's Manual.

Limiter/Protect indicator LED

LIMITER/ PROTECT

This front and rear panel LED (representing the output channel) lights red under three circumstances:

- When audio clipping occurs, the LED blinks once per clip occurrence.
- When the amplifier overheats, the LED is lit. The LED is not lit after the amplifier cools down and recovers from the overheated condition.
- When DC output is detected, the amplifier is malfunctioning and the LED is lit. When a malfunction occurs, power down the amplifier and power it back up. If the LED still remains lit, the amplifier requires servicing.

Signal indicator LED

SIGNAL

This front and rear panel LED (representing the input channel) lights green only when a signal is detected on the input channel.

Level adjustment

Level adjustment — Use a Tweeker or small screwdriver to adjust the audio input level. The analog potentiometer controls the level from -∞ (full attenuation) to 0 dB.

NOTE *On the XPA 2001-70V, the single control adjusts the levels of both left and right channels simultaneously prior to summing them together.*

To adjust the XPA amplifier's input level, do the following:

1. Make sure that the source signal is active.
2. Before powering up the amplifier, adjust the output level to the lowest setting (fully counterclockwise).
3. Power up the amplifier.
4. Adjust level by turning the adjustment clockwise until audio distortion begins to occur, then back off the adjustment (turning counterclockwise) until the distortion disappears.

Automatic standby mode

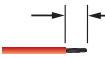
The XPA goes into standby mode after approximately one hour of inactivity. The XPA comes out of standby mode approximately one second after detecting an input signal (unless in manual standby — see "Remote control connector").

c UL us LISTED 17TT AUDIO/VIDEO APPARATUS

N15779

Audio input wiring

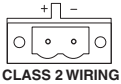
Unbalanced Mono Input **Balanced Mono Input**



Do not tin the wires!

CAUTION *Connect the sleeve to ground (Gnd). Connecting the sleeve to a negative (-) terminal will damage the audio output circuits.*

Audio output wiring



CLASS 2 WIRING

Mono audio output connector — Marked "+" and "-", wire the included 2-pole, 5.08 mm screw lock captive screw connector to output mono audio. Observe the correct polarity. Output is designed to power 70 V line distribution systems and is rated at 200 watts.

NOTE *You must use Class 2 wiring for this output to comply with UL requirements.*

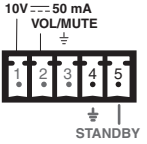
WARNING *Do not short out the "+" and "-" connectors, doing so will damage the amplifier.*

High pass filter switch

Set the switch to 80 Hz to prevent the saturation of 70 V/100 V speaker input transformers by low frequency signals.

NOTE *Set to OFF if filtering is applied before the amplifier.*

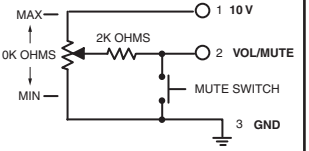
Remote control connector



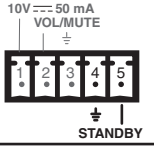
Remote control connector — The 3.5 mm 5-pin captive screw receptacle is used to remotely control two functions through contact closure:

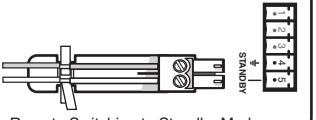
1. As shown on the left, pins 1, 2, and 3 control volume by varying the DC voltage from 0 V (full attenuation) to 10 V (maximum volume) with full muting in effect when pin 2 is connected to ground (pin 3). See the circuit diagram below.

NOTE *Maximum volume output is dependent on input level adjustment.*



2. As shown below, pin 5 connected to ground (pin 4) places the amplifier in standby mode. Standby mode turns off all output, although the amplifier is still receiving power. Use the included 2-pin, 3.5 mm captive screw connector plug to remotely ground pin 5.





Remote Switching to Standby Mode

Extron **USA - West** Headquarters
+800.633.9876 Inside USA / Canada Only
+1.714.491.1500
+1.714.491.1517 FAX

Extron **USA - East**
+800.633.9876 Inside USA / Canada Only
+1.919.863.1794
+1.919.863.1797 FAX

Extron **EMEA**
+800.3987.6673 Inside Europe Only
+31.33.453.4040
+31.33.453.4050 FAX

Extron **Asia**
+800.7339.8766 Inside Asia Only
+65.6383.4400
+65.6383.4664 FAX

Extron **Japan**
+81.3.3511.7655
+81.3.3511.7656 FAX

Extron **China**
+400.883.1568 Inside China Only
+86.21.3760.1568
+86.21.3760.1566 FAX

Extron **Middle East**
+971.4.2991800
+971.4.2991880 FAX

www.extron.com

33-1522-01 **Rev. A**
09 08